

RF COIL FOR VERY HIGH FIELD MAGNETIC RESONANCE IMAGING

ABSTRACT OF THE DISCLOSURE

(032)A radio frequency (RF) coil assembly for a very high field Magnetic Resonance Imaging (MRI) system is provided comprising a plurality of conductors arranged cylindrically and disposed about a cylindrical patient bore tube of the MRI system and a plurality of capacitive elements for electrically interconnecting the plurality of conductors at respective ends of the conductors. The conductors have a width selected for the RF coil assembly to resonate at substantially high frequencies. A very high field Magnetic Resonance Imaging (MRI) system is provided that comprises a RF coil assembly adapted to resonate at substantially high frequencies, a RF coil shield assembly and a plurality of RF drive power cables.